

MEETING MINUTES
LIGNITE RESEARCH COUNCIL
January 24, 2008
Best Western Doublewood Inn, Bismarck, ND

MEMBERS (or their authorized alternates) PRESENT:

Mark Albers, North Dakota Farm Bureau
Steve Benson, Energy & Environmental Research Center
Mike Briggs, The Falkirk Mining Company
Charlie Bullinger, Great River Energy
Randel Christmann, ND Senate
Kevin Cramer, ND Public Service Commission
Doug Deverne, SaskPower
John Dwyer, Lignite Energy Council/Lignite Research Council
Layton Freborg, ND Senate
Joe Friedlander, The Coteau Properties Company
L. David Glatt, North Dakota Department of Health
Paul Govig, North Dakota Department of Commerce
Mike Hummel, BNI Coal, Ltd.
Bruce Imsdahl, Montana-Dakota Utilities Co.
Luther Kvernien, Minnkota Power Cooperative, Inc.
Vernon Laning, Basin Electric Power Cooperative
Gary Loop, Dakota Gasification Company
Larry Morris, Ironworkers Local Union 512
Ed Murphy, ND Geological Survey
Al Rudeck, Minnesota Power
Jan Rudolf, Otter Tail Power Company
Jenny Tennant, U. S. Department of Energy – National Energy Technology Laboratory
Robert Tollefson, ND Coal Conversion Counties Association
Rich Voss, Great Northern Power Development
Bill Weaver, Westmoreland Coal Company

OTHERS PRESENT:

Dave Allard, Lignite Energy Council
Jeff Burgess, Lignite Research Council
Jim Deutsch, North Dakota Public Service Commission
Karlene Fine, North Dakota Industrial Commission
Vicki Gilmore, Lignite Energy Council
John Harju, Energy & Environmental Research Center
Mike Jones, Ph.D. – Energy & Environmental Research Center
Ed Steadman, Energy & Environmental Research Center
Sandi Tabor, Lignite Energy Council
Jessica Unruh, The Coteau Properties Company

Lignite Research Council (LRC) chairman John Dwyer called the LRC meeting to order at 12:12 p.m. (Central Time) January 24, 2008, at the Best Western Doublewood Inn, Bismarck, ND.

Approval of November 19, 2007 LRC Meeting Minutes:

Dwyer asked for a motion to approve the minutes of the November 19, 2007 LRC meeting. Vernon Laning so moved; seconded by Al Rudeck. Motion carried.

Program Financial Summary:

Karlene Fine, executive director and secretary of the North Dakota Industrial Commission (NDIC), briefly summarized the Lignite Research Program's (Program) \$3,725,000 approved annual budget allocations (May '06).

Available funding for the 2007-2009 biennium (as of 1/24/08) is \$345,739 for administration of the Program; \$1,000,000 for non-matching feasibility studies (Lignite Energy Council Lignite Vision 21 Program, transmission, litigation, etc.); \$1,126,465 for small research projects; \$0 for marketing projects; and \$2,404,043 for demonstration projects (the \$2,404,043 does not include the commitment of \$9,652,278 over future biennia for the final phases of the Lignite Vision 21 Program projects: Gascoyne, Coal-to-Liquids, Spiritwood Energy; it does include NDIC borrowing up to \$7.5 million to meet cash flow needs).

Jeff Burgess, technical advisor for the NDIC and the LRC, summarized the Lignite Research, Development and Marketing Program (Program) financial information. From 1987 to present, there have been 126 small research projects (\$16.4 M from NDIC for the 126 projects; \$98.4 total project costs; \$1 in state funds to \$6 total investment); 18 demonstration projects excluding Lignite Vision 21 Program (LV21P) projects (\$16.1 M from NDIC for the 18 projects; \$219 M total project costs; \$1 in state funds to \$14 total); and eight LV21P projects (\$32.2 M from NDIC; more than \$250 M total project costs.) He said that the current technical advisor activities involve 32 projects (\$37.2 M in project funds). There are 19 small research projects (\$5 M from NDIC; \$41 M total project costs); 12 demonstration projects (\$2 M (eight non-LV21P projects); \$93 M total project costs); \$29.3 M (four LV21P projects); more than \$245 M total project costs); and one marketing project (\$2.4 M from NDIC; \$4.8 M total project costs).

Project Updates:

Burgess gave a brief review of the 32 active projects: one Lignite Energy Council LV21P project, four separate LV21P project, 16 mercury-related projects, three lignite gasification-related projects, three CO₂ CCS-related projects, one NO_x – related project, one regional lignite energy marketing project (Partners for Affordable Energy), one lignite demonstration for agricultural production (Red Trail Energy project), one coal combustion products project (Medora project), and one air toxics metals project (CATM).

Grant Round LXIII (63) Grant Application LRC-LXIII-A: “Proposal to North Dakota Lignite Research Council for the Plains CO₂ Reduction Partnership Program – Phase III”; Submitted by: Energy & Environmental Research Center (EERC); Project Manager: Edward Steadman; Request for: \$2,400,000; Total Project Costs: \$136,231,052; Project Duration: 10 Years.

Burgess said that with this project, EERC proposes to demonstrate the feasibility of two carbon dioxide (CO₂) geological sequestration projects. One project involves one in North Dakota and one in British Columbia, Canada. The project in North Dakota involves capturing CO₂ from an existing coal-fired power plant and injected into suitable geologic formations for enhanced oil recovery and long-term storage. The project in British Columbia involves injection of CO₂ –rich acid gas that will be injected into a deep brine formation.

Burgess said that the three technical peer reviewers gave the proposal an average weighted score of 203 out of 250 points. (The weighted scores were 195 out of 250 points from reviewer 07-31, 237 out of 250 points from reviewer 07-32 and 178 out of 250 points from reviewer 07-33.) All three technical peer reviewers recommended that the project be funded.

As technical advisor, Burgess recommended that the project be funded, and that there be no contingencies. He said that the demonstration of cost-effective, environmentally sound capture and storage of CO₂ is critical to the future of the lignite industry. It is necessary and appropriate for increased public-private investment in carbon capture and storage research, development, demonstration, and deployment of technologies in order to achieve greenhouse gas management objectives already being established, or being contemplated, by various governmental bodies.

Burgess said that the following entities are conflict-of-interest parties for the proposal are EERC, Minnesota Power, Montana-Dakota Utilities Co., Great River Energy, Minnkota Power Cooperative, Basin Electric Power Cooperative, The North American Coal Corporation, Otter Tail Power Company, Great Northern Power Development, SaskPower, Westmoreland Coal Company and BNI Coal, Ltd.

Ed Steadman of EERC gave a presentation in support of the proposal. Gary Loop briefly discussed Dakota Gasification Company's carbon capture sequestration process.

Ballot Results re: Grant Round LXIII (63) Proposal:

Dwyer announced the results of the LRC's confidential ballots concerning recommendations for NDIC funding of the Grant Round LXIII (63) proposal:

Grant Round LXIII (63) Grant Application LRC-LXIII-A: "Proposal to North Dakota Lignite Research Council for the Plains CO2 Reduction Partnership Program – Phase III" -

Fund: 24 votes. **Do Not Fund:** 1 vote.

NDIC Meeting – February, 2007:

The LRC's recommendation concerning the Grant Round LXIII (63) request will be considered by the NDIC in February, 2008 (date to be determined, per Karlene Fine).

Grant Application Deadline Dates for 2008; Remaining LRC Meetings for 2008:

April 1st and October 1st are the grant application deadline dates for 2008. LRC meetings will be held at 12:00 p.m. (Central Time) May 20, 2008 and November 25, 2008, both at the Best Western Doublewood Inn, Bismarck.

Adjournment

There being no further business, Dwyer requested a motion to adjourn the LRC meeting. Bill Weaver so moved; seconded by Mike Hummel. Motion carried. The meeting adjourned at 2:45 p.m.

Vicki Gilmore, Recording Secretary
